



## CONTENTS OF VOLUME 147

Vol. 147C, No. 1

### In Appreciation

#### 1 In Appreciation

### General papers

**B.N. Walcher and R.R. Miller Jr.**

11 Ethanol-induced increased endogenous homocysteine levels and decreased ratios of SAM/SAH are only partially attenuated by exogenous glycine in developing chick brains

**D. Li, X.-L. Yang, S.-J. Zhang, M. Lin, W.-J. Yu and K. Hu**

17 Effects of mammalian CYP3A inducers on CYP3A-related enzyme activities in grass carp (*Ctenopharyngodon idellus*): Possible implications for the establishment of a fish CYP3A induction model

**H. Lin, D. De Vos, E. Decuypere and J. Buyse**

30 Dynamic changes in parameters of redox balance after mild heat stress in aged laying hens (*Gallus gallus domesticus*)

**L.G. Azevedo, A.L. Muccillo-Baisch, D.d.M.V.B. Filgueira, R.T. Boyle, D.F. Ramos, A.D. Soares, C. Lerner, P.A. Silva and G.S. Trindade**

36 Comparative cytotoxic and anti-tuberculosis activity of *Aplysina caissara* marine sponge crude extracts

**F. Garcia Sampaio, C. de Lima Boijink, E. Tie Oba, L. Romagueira Bichara dos Santos, A. Lúcia Kalinin and F. Tadeu Rantin**

43 Antioxidant defenses and biochemical changes in pacu (*Piaractus mesopotamicus*) in response to single and combined copper and hypoxia exposure

**A. Hontela, V.S. Leblond and J.P. Chang**

52 Purification and isolation of corticosteroidogenic cells from head kidney of rainbow trout (*Oncorhynchus mykiss*) for testing cell-specific effects of a pesticide

**A. Jemec, T. Tišler, D. Drobne, K. Sepčić, P. Jamnik and M. Roš**

61 Biochemical biomarkers in chronically metal-stressed daphnids

**P. Doyen, A. Bigot, P. Vasseur and F. Rodius**

69 Molecular cloning and expression study of pi-class glutathione S-transferase (pi-GST) and selenium-dependent glutathione peroxidase (Se-GPx) transcripts in the freshwater bivalve *Dreissena polymorpha*

**A.Y.O. Matsuo, E.P. Gallagher, M. Trute, P.L. Stapleton, R. Levado and D. Schlenk**

78 Characterization of Phase I biotransformation enzymes in coho salmon (*Oncorhynchus kisutch*)

**P.B.V. Sales and M.L. Santoro**

85 Nucleotidase and DNase activities in Brazilian snake venoms

**Q. Huang, L. Liang, T. Wei, D. Zhang and Q.-Y. Zeng**

96 Purification and partial characterization of glutathione transferase from the teleost *Monopterus albus*

**B. Sanni, K. Williams, E.P. Sokolov and I.M. Sokolova** 101 Effects of acclimation temperature and cadmium exposure on mitochondrial aconitase and LON protease from a model marine ectotherm, *Crassostrea virginica*

**M.E. Girón, A.M. Salazar, I. Aguilar, J.C. Pérez, E.E. Sánchez, C.L. Arocha-Piñango, A. Rodríguez-Acosta and B. Guerrero** 113 Hemorrhagic, coagulant and fibrino(geno)lytic activities of crude venom and fractions from mapanare (*Bothrops colombiensis*) snakes

**S.S. Borković, S.Z. Pavlović, T.B. Kovacević, A.Š. Štajn, V.M. Petrović and Z.S. Sačić** 122 Antioxidant defence enzyme activities in hepatopancreas, gills and muscle of Spiny cheek crayfish (*Orconectes limosus*) from the River Danube

**W. Sanchez, C. Goin, F. Brion, P.E. Olsson, A. Goksøy and J.M. Porcher** 129 A new ELISA for the three-spined stickleback (*Gasterosteus aculeatus* L.) spiggin, using antibodies against synthetic peptide

I Call for Papers: 6th ISFE 2008

II Call for Papers: SEB Annual Main Meeting, Marseille - 2008

Vol. 147C, No. 2

**General papers**

**C. Larose, R. Canuel, M. Lucotte and R.T. Di Giulio** 139 Toxicological effects of methylmercury on walleye (*Sander vitreus*) and perch (*Perca flavescens*) from lakes of the boreal forest

**Y.-M. Lee, J.-S. Rhee, D.-S. Hwang, I.-C. Kim, S. Raisuddin and J.-S. Lee** 150 *p53* gene expression is modulated by endocrine disrupting chemicals in the hermaphroditic fish, *Kryptolebias marmoratus*

**M. Fernández-Navarro, J. Peragón, V. Amores, M. De La Higuera and J.A. Lupiáñez** 158 Maslinic acid added to the diet increases growth and protein-turnover rates in the white muscle of rainbow trout (*Oncorhynchus mykiss*)

**S.S. Soares, H. Martins, C. Gutiérrez-Merino and M. Aureliano** 168 Vanadium and cadmium *in vivo* effects in teleost cardiac muscle: Metal accumulation and oxidative stress markers

**B.K. Dutra, F.A. Fernandes and G.T. Oliveira** 179 Carbofuran-induced alterations in biochemical composition, lipoperoxidation, and  $\text{Na}^+/\text{K}^+$  ATPase activity of *Hyalella plesioacuta* and *Hyalella curvispina* in bioassays

**V. Felten, G. Charmantier, M. Charmantier-Daures, F. Aujoulat, J. Garric and O. Geffard** 189 Physiological and behavioural responses of *Gammarus pulex* exposed to acid stress

**R.M. Golombieski, D.A.S. Graichen, L.A. Pivetta, C.W. Nogueira, E.L.S. Loreto and J.B.T. Rocha** 198 Diphenyl diselenide [(PhSe)<sub>2</sub>] inhibits *Drosophila melanogaster*  $\delta$ -aminolevulinate dehydratase ( $\delta$ -ALA-D) gene transcription and enzyme activity

**L.A. Hendon, E.A. Carlson, S. Manning and M. Brouwer** 205 Molecular and developmental effects of exposure to pyrene in the early life-stages of *Cyprinodon variegatus*

**A.F.S. Queiroz, R.M. Moura, J.K.C. Ribeiro, I.L. Lyra, D.C.S. Cunha, E.A. Santos and M.P. de-Sales** 216 Pro-inflammatory effect in mice of CvL, a lectin from the marine sponge *Cliona varians*

**V.d.C. Langiano and C.B.R. Martinez** 222 Toxicity and effects of a glyphosate-based herbicide on the Neotropical fish *Prochilodus lineatus*

**F. Boldrin, G. Santovito, A. Formigari, Y. Bisharyan, D. Cassidy-Hanley, T.G. Clark and E. Piccinni** 232 *MTT2*, a copper-inducible metallothionein gene from *Tetrahymena thermophila*

**A. Cevasco, R. Urbatzka, S. Bottero, A. Massari, F. Pedemonte, W. Kloas and A. Mandich** 241 Endocrine disrupting chemicals (EDC) with (anti)estrogenic and (anti)androgenic modes of action affecting reproductive biology of *Xenopus laevis*: II. Effects on gonad histomorphology

**G.A. Wiggers, I. Stefanon, A.S. Padilha, F.M. Peçanha, D.V. Vassallo and E.M. Oliveira** 252 Low nanomolar concentration of mercury chloride increases vascular reactivity to phenylephrine and local angiotensin production in rats

I Call for Papers: 6th ISFE 2008

II Call for Papers: SEB Annual Main Meeting, Marseille - 2008

*Vol. 147C, No. 3*

**Review**

**I. Ketata, X. Denier, A. Hamza-Chaffai and C. Minier** 261 Endocrine-related reproductive effects in molluscs

**General papers**

**J.D. Woodman, V.S. Haritos and P.D. Cooper** 271 Effects of phosphine on the neural regulation of gas exchange in *Periplaneta americana*

**T. Uno, S. Okamoto, S. Masuda, H. Imaishi, M. Nakamura, K. Kanamaru, H. Yamagata, M.A.H. El-Kady, Y. Kaminishi and T. Itakura** 278 Bioconversion by functional P450 1A9 and P450 1C1 of *Anguilla japonica*

**Y.K. Choi, P.G. Jo and C.Y. Choi** 286 Cadmium affects the expression of heat shock protein 90 and metallothionein mRNA in the Pacific oyster, *Crassostrea gigas*

**Y. Sun, L. Jin, T. Wang, J. Xue, G. Liu, X. Li, J. You, S. Li and Y. Xu** 293 Polysaccharides from *Astragalus membranaceus* promote phagocytosis and superoxide anion ( $O_2^-$ ) production by coelomocytes from sea cucumber *Apostichopus japonicus* *in vitro*

**Y.-M. Lee, S. Raisuddin, J.-S. Rhee, J.-S. Ki, I.-C. Kim and J.-S. Lee** 299 Modulatory effect of environmental endocrine disruptors on N-ras oncogene expression in the hermaphroditic fish, *Kryptolebias marmoratus*

**J. Verreault, R. Dietz, C. Sonne, W.A. Gebbink, S. Shahmiri and R.J. Letcher** 306 Comparative fate of organohalogen contaminants in two top carnivores in Greenland: Captive sledge dogs and wild polar bears

**J.W. Pyatskowit and J.R. Prohaska** 316 Copper deficient rats and mice both develop anemia but only rats have lower plasma and brain iron levels

**B. Arends, E. Slump, B. Spee, J. Rothuizen and L.C. Penning** 324 Hepatocyte growth factor improves viability after  $H_2O_2$ -induced toxicity in bile duct epithelial cells

**P.E. Drevnick, A.P. Roberts, R.R. Otter, C.R. Hammerschmidt, R. Klaper and J.T. Oris** 331 Mercury toxicity in livers of northern pike (*Esox lucius*) from Isle Royale, USA

Contents of volume

<b>T. Okuno, A. Yabuki, M. Shiraishi, T. Obi and A. Miyamoto</b>	339	Histamine-induced modulation of vascular tone in the isolated chicken basilar artery: A possible involvement of endothelium
<b>R. Eguchi, A. Ishihara and K. Yamauchi</b>	345	Interaction of diethylstilbestrol and ioxynil with transthyretin in chicken serum
<b>Y. Duan and R.A. Nicholson</b>	351	20(S)-protopanaxadiol and the ginsenoside Rh <sub>2</sub> inhibit Na <sup>+</sup> channel-activated depolarization and Na <sup>+</sup> channel-dependent amino acid neurotransmitter release in synaptic fractions isolated from mammalian brain
<b>J.-S. Rhee, J.S. Seo, S. Raisuddin, J.-S. Ki, K.-W. Lee, I.-C. Kim, Y.-D. Yoon and J.-S. Lee</b>	357	Gonadotropin-releasing hormone receptor ( <i>GnRHR</i> ) gene expression is differently modulated in gender types of the hermaphroditic fish <i>Kryptolebias marmoratus</i> by zebrafish disrupting chemicals
<b>T.A. Stueckle, J. Likens and C.M. Foran</b>	366	Limb regeneration and molting processes under chronic methoprene exposure in the mud fiddler crab, <i>Uca pugnax</i>
<b>J.-C. Amiard, R. Journei and H. Bachelet</b>	378	Influence of field and experimental exposure of mussels ( <i>Mytilus</i> sp.) to nickel and vanadium on metallothionein concentration
<b>C. Estey, X. Chen and T.W. Moon</b>	386	3-Hydroxy-3-methylglutaryl coenzyme A reductase in rainbow trout: Effects of fasting and statin drugs on activities and mRNA transcripts

Vol. 147C, No. 4

Review

<b>F.R. Buttarelli, C. Pellicano and F.E. Pontieri</b>	399	Neuropharmacology and behavior in planarians: Translations to mammals
--	-----	---

General papers

<b>B.C. Cavalcanti, C.M.L. Sombra, J.H.H.L. de Oliveira, R.G.d.S. Berlinck, M.O. de Moraes and C. Pessoa</b>	409	Cytotoxicity and genotoxicity of ingenamine G isolated from the Brazilian marine sponge <i>Pachychalina alcaloidifera</i>
<b>T.S.F. Hori, I.M. Avilez, G.K. Iwama, S.C. Johnson, G. Moraes and L.O.B. Afonso</b>	416	Impairment of the stress response in matrinxã juveniles ( <i>Brycon amazonicus</i> ) exposed to low concentrations of phenol
<b>R. Marques-Porto, I. Lebrun and D.C. Pimenta</b>	424	Self-proteolysis regulation in the <i>Bothrops jararaca</i> venom: The metallopeptidases and their intrinsic peptidic inhibitor
<b>B. Lukšić, I. Brizic, M. Lang Balija, D. Modun, V. Culic, B. Halassy, I. Salamunic and M. Boban</b>	434	Dose dependent effects of standardized nose-horned viper ( <i>Vipera ammodytes ammodytes</i> ) venom on parameters of cardiac function in isolated rat heart
<b>J.L. Fitzpatrick, S. Nadella, C. Bucking, S. Balshine and C.M. Wood</b>	441	The relative sensitivity of sperm, eggs and embryos to copper in the blue mussel ( <i>Mytilus trossulus</i> )
<b>M. Minghetti, M.J. Leaver, E. Carpenè and S.G. George</b>	450	Copper transporter 1, metallothionein and glutathione reductase genes are differentially expressed in tissues of sea bream ( <i>Sparus aurata</i> ) after exposure to dietary or waterborne copper
<b>P.G. Jo, Y.K. Choi and C.Y. Choi</b>	460	Cloning and mRNA expression of antioxidant enzymes in the Pacific oyster, <i>Crassostrea gigas</i> in response to cadmium exposure

**A. Arukwe and B. Nordbø**

470 Hepatic biotransformation responses in Atlantic salmon exposed to retinoic acids and 3,3',4,4'-tetrachlorobiphenyl (PCB congener 77)

I Contents of Volume 147

VI Subject Index

VIII Author Index

X Announcement: 25th ESCPBnew Conference – Ravenna (Italy),  
7–11 September 2008

## SUBJECT INDEX

Vol. 147C, Nos. 1-4

Acid stress, 189  
Aconitase, 101  
Acute toxicity, 222  
AhR, 470  
ALA-D, 198  
Aminopyrine *N*-demethylase, 17  
Amphibians, 241  
Androgens, 129  
Anemia, 316  
Antioxidant defence enzymes, 122  
Antioxidant defenses, 43  
Anti-tuberculosis assay, 36  
*Aplysina caissara* marine sponge, 36  
*Apostichopus japonicus* (Selenka), 293  
Apyrase, 85  
Arctic, 306  
Aryl hydrocarbon receptor, 205  
*Astragalus membranaceus*, 293  
Atorvastatin, 386

Behavior, 399  
Bioaccumulation, 306  
Biomonitoring, 122  
Biotransformation, 78, 222, 306, 470  
Birds, 339  
Bivalves, 101  
Bivalvia mollusc, 69  
Blood parameters, 43  
*Bothrops colombiensis*, 113  
*Bothrops jararaca*, 424  
Brain, 11, 316, 339, 386  
*Brycon amazonicus*, 416

Cadmium, 101, 168, 286  
Cadmium (Cd), 61  
Cardiotoxicity, 434  
Caspase-3, 11, 324  
CAT, 460  
Catalase, 61  
CD39, 85  
CD73, 85  
Cerebral artery, 339  
Cerivastatin, 386  
Chemical carcinogenesis, 150  
Chick, 11  
Cholangiocyte, 324  
Cholesterol, 386  
Cholinesterase, 61

Chromium (Cr (VI)), 61  
Chronic toxicity test, 61  
*Cliona varians*, 216  
CNS, 271  
Coagulation, 113  
Coding sequences, 69  
Coho salmon, 78  
Computer-assisted sperm analysis, 441  
Copper, 450  
Copper deficient, 316  
Corticosteroidogenic cells, 52  
Cortisol, 52, 416  
Crustacea, 366  
Ctr1, 450  
CYP3A, 17  
CYP1A, 205  
*Cyprinodon variegatus*, 205  
Cytochrome P450, 78  
Cytotoxic assay, 36  
Cytotoxicity, 409

*Daphnia magna*, 61  
Decameric vanadate, 168  
Development, 441  
Developmental toxicity, 205  
Dietary copper, 450  
Diphenyl diselenide, 198  
Discontinuous gas exchange, 271  
*Dreissena polymorpha*, 69  
*Drosophila melanogaster*, 198

Ecotoxicology, 441  
Eggs, 441  
ELISA, 129  
Endocrine disrupting chemicals, 150, 241, 299  
Endocrine-disrupting chemicals, 357  
Endocrine disruption, 366  
Endocrine disruptors, 261, 416  
Endocrine system, 261  
Endosulfan, 52  
Endothelial cells, 339  
Endothelium, 252  
Environmental carcinogenesis, 299  
Environmental chemicals, 345  
Enzyme, 198  
Enzyme activity, 101  
Enzyme assay, 96

Erythromycin *N*-demethylase, 17  
Ethanol-induced, 11  
Evolution, 399  
Exonuclease, 85  
Experimental exposure, 378  
Expression, 150  
Expression pattern, 69

Feed additive, 158  
Fertilization, 441  
Fibrinolysis, 113  
Field study, 378  
Fish, 52, 168, 205, 278, 299  
Fish physiological condition, 139  
Flavanone, 278  
Flavin-containing monooxygenase, 78  
Fowl, 339

*Gammarus pulex*, 189  
Gene expression, 205, 286, 450, 460  
Genotoxicity, 409  
Glucose, 386  
L-Glutamate and GABA release, 351  
Glutathione, 139, 324  
Glutathione reductase, 450  
Glutathione *S*-transferase, 61  
Glutathione transferase, 96  
Glycine, 11  
Gonad morphology, 241  
Gonadotropin-releasing hormone receptor, 357  
GPX, 460  
Grass carp, 17  
Greenland, 306

H<sub>2</sub>O<sub>2</sub>, 324  
Heart, 168  
Heat exposure, 30  
Heavy metals, 43, 232  
Hemolymph, 286, 460  
Hepatosomatic indices, 139  
HGF, 324  
Histamine, 339  
HMGCoAR, 386  
Homocysteine, 11  
Hormone mimic, 366  
Hormones, 261  
HPLC, 278

HSP90, 286  
 hsp70, 416  
*Hyalella curvispina*, 179  
*Hyalella pleoacuta*, 179

*In vitro* model, 17  
 Induction, 17  
 Ingénamine G, 409  
 Inhibitors, 424  
 Interaction, 345  
 Interactions, 470  
 Intermediate metabolism, 179  
 Intestine, 316  
 Intra-population venom variability, 113  
 Ion loss, 189  
 Iron, 316  
 Isolated heart, 434

*Kryptolebias marmoratus*, 150, 299, 357

Lambrō river, 241  
 Laying hens, 30  
 $LC_{50}$ , 222  
 Leukocyte migration, 216  
 Limb regeneration, 366  
 Lipid hydroperoxide, 43  
 Lipofuscin, 331  
 Lipoperoxidation, 179  
 Liver, 331, 386  
 Liver histopathology, 222  
 Local rennin-angiotensin system, 252  
 Locomotion, 189  
 LON protease, 101

Marine sponge, 216  
 Maslinic acid, 158  
 Mass spectrometry, 424  
 Membrane potential, 351  
 Mercury, 252, 331  
 Metabolites, 306  
 Metal distribution, 168  
 Metallopeptidase, 424  
 Metallothionein, 43, 378, 450  
 Metallothioneins, 232  
 Metathoracic ganglion, 271  
 Methoprene, 366  
 Methylmercury, 139, 331  
 Mice, 198, 316  
 Mitochondria, 101  
 Modulation, 150, 357  
 Molluscs, 261  
 Molting, *Uca pugnax*, 366

Monoxygenase, 278  
*Monopterus albus*, 96  
 Mouse brain, 351  
 mRNA expression, 101  
 MT, 286  
 Mussel, 378

$Na^+/K^+$ -ATPase, 43  
 $Na^+/K^+$  ATPase, 179  
 Neural transmission, 399  
 Nickel, 378  
 Nitric oxide, 252, 339  
 Northern pike, 331  
*N-ras*, 299  
 Nucleoside triphosphate diphosphohydrolase (NTPDase), 85  
 Nucleotide pyrophosphatase/phosphodiesterase (NPP), 85

Olfactory rosettes, 78  
 Oncogenes, 299  
*Oncorhynchus mykiss*, 158, 386  
 Organohalogen contaminants, 306  
 Osmolality, 189  
 Osmoregulation, 222  
 Oxidative stress, 122, 168, 222, 324

*p53*, 150  
 P450, 278  
*Pachychalina alcaloidifera*, 409  
 Pacific oyster, 286, 460  
 Paw oedema, 216  
 PCB-77, 470  
 Peptides, 424  
 Percoll, 52  
 Peritonitis, 216  
 Pesticide, 52  
 Phagocytic amoebocytes, 293  
 Phagocytosis, 293  
 Phenol, 416  
 Phenylephrine, 252  
 Phosphomonoesterase, 85  
 Pi-class GST, 69  
 Planarian, 399  
 Plasma, 316  
 Polar bears, 306  
 Protein-turnover rates, 158  
 Purification, 96  
 Pyrene, 205

RAR $\alpha$ , 470  
 Reactive oxygen species, 30, 43, 252

Recombinant protein expression, 232  
 Reproduction, 261  
 Respirometry, 271  
 Retinoic acids, 470  
 $Rh_2$ , 351  
 Rifampicin, 17  
 River Danube, 122  
 ROS, 324  
 Roundup, 222

*S*-adenosylhomocysteine, 11  
*S*-adenosylmethionine, 11  
 20(S)Protopanaxadiol, 351  
 Selenium-dependent GPx, 69  
 Serum protein, 345  
 Sledge dogs, 306  
 Snake, 85  
 Snake venom, 113, 424, 434  
 SOD, 460  
 Sodium channel, 351  
*Sparus aurata*, 450  
 Sperm, 441  
 Spermiotoxicity, 441  
 Spiggin, 129  
 Spiny cheek crayfish, 122  
 Steroids, 278  
 Stress, 30, 416  
 Stress response, 222  
 Superoxide anion ( $O_2^-$ ) production, 293  
 Survival, 189

Teleost, 17  
 Temperature, 101, 293  
 $6\beta$ -Testosterone hydroxylase, 17  
*Tetrahymena thermophila*, 232  
 Three-spined stickleback, 129  
 Toxicology bioassay, 179  
 Transthyretin, 345

Vanadium, 168, 378  
 VEGF, 205  
 Venom, 85  
 Ventilation, 189  
*Vipera ammodytes ammodytes*, 434

Walleye, 139  
 Water pollutants, 43  
 Waterborne copper, 450  
 White muscle, 158

Xenopus laevis, 241

## AUTHOR INDEX

Vol. 147, Nos. 1-4

Afonso, L.O.B., 416  
Aguilar, I., 113  
Amiard, J.-C., 378  
Amores, V., 158  
Arends, B., 324  
Arocha-Piñango, C.L., 113  
Arukwe, A., 470  
Aujoulat, F., 189  
Aureliano, M., 168  
Avilez, I.M., 416  
Azevedo, L.G., 36  
  
Bacheley, H., 378  
Balshine, S., 441  
Berlinck, R.G.d.S., 409  
Bigot, A., 69  
Bisharyan, Y., 232  
Boban, M., 434  
Boldrin, F., 232  
Borković, S.S., 122  
Bottero, S., 241  
Boyle, R.T., 36  
Brion, F., 129  
Brizic, I., 434  
Brouwer, M., 205  
Bucking, C., 441  
Buttarelli, F.R., 399  
Buyse, J., 30  
  
Canuel, R., 139  
Carlson, E.A., 205  
Carpenè, E., 450  
Cassidy-Hanley, D., 232  
Cavalcanti, B.C., 409  
Cevasco, A., 241  
Chang, J.P., 52  
Charmantier, G., 189  
Charmantier-Daures, M., 189  
Chen, X., 386  
Choi, C.Y., 286, 460  
Choi, Y.K., 286, 460  
Clark, T.G., 232  
Cooper, P.D., 271  
Culic, V., 434  
Cunha, D.C.S., 216  
  
De La Higuera, M., 158  
de Lima Boijink, C., 43  
  
de Moraes, M.O., 409  
de Oliveira, J.H.H.L., 409  
de-Sales, M.P., 216  
De Vos, D., 30  
Decuypere, E., 30  
Denier, X., 261  
Di Giulio, R.T., 139  
Dietz, R., 306  
Doyen, P., 69  
Drevnick, P.E., 331  
Drobné, D., 61  
Duan, Y., 351  
Dutra, B.K., 179  
  
Eguchi, R., 345  
El-Kady, M.A.H., 278  
Estey, C., 386  
  
Felten, V., 189  
Fernandes, F.A., 179  
Fernández-Navarro, M., 158  
Filgueira, D.d.M.V.B., 36  
Fitzpatrick, J.L., 441  
Foran, C.M., 366  
Formigari, A., 232  
  
Gallagher, E.P., 78  
Garcia Sampaio, F., 43  
Garric, J., 189  
Gebbink, W.A., 306  
Geffard, O., 189  
George, S.G., 450  
Giron, M.E., 113  
Goin, C., 129  
Goksøyrt, A., 129  
Golombieski, R.M., 198  
Graichen, D.A.S., 198  
Guerrero, B., 113  
Gutiérrez-Merino, C., 168  
  
Halassy, B., 434  
Hammerschmidt, C.R., 331  
Hamza-Chaffai, A., 261  
Haritos, V.S., 271  
Hendon, L.A., 205  
Hontela, A., 52  
Hori, T.S.F., 416  
Hu, K., 17  
  
Huang, Q., 96  
Hwang, D.-S., 150  
  
Imaishi, H., 278  
Ishihara, A., 345  
Itakura, T., 278  
Iwama, G.K., 416  
  
Jamnik, P., 61  
Jemec, A., 61  
Jin, L., 293  
Jo, P.G., 286, 460  
Johnson, S.C., 416  
Journel, R., 378  
  
Kaminishi, Y., 278  
Kanamaru, K., 278  
Ketata, I., 261  
Ki, J.-S., 299, 357  
Kim, I.-C., 150, 299, 357  
Klaper, R., 331  
Kloas, W., 241  
Kovačević, T.B., 122  
  
Lang Balija, M., 434  
Langiano, V.d.C., 222  
Larose, C., 139  
Leaver, M.J., 450  
Leblond, V.S., 52  
Lebrun, I., 424  
Lee, J.-S., 150, 299, 357  
Lee, K.-W., 357  
Lee, Y.-M., 150, 299  
Lerner, C., 36  
Letcher, R.J., 306  
Levado, R., 78  
Li, D., 17  
Li, S., 293  
Li, X., 293  
Liang, L., 96  
Likens, J., 366  
Lin, H., 30  
Lin, M., 17  
Liu, G., 293  
Loreto, E.L.S., 198  
Lúcia Kalinin, A., 43  
Lucotte, M., 139  
Luksic, B., 434

Lupiáñez, J.A., 158  
 Lyra, I.L., 216

Mandich, A., 241  
 Manning, S., 205  
 Marques-Porto, R., 424  
 Martinez, C.B.R., 222  
 Martins, H., 168  
 Massari, A., 241  
 Masuda, S., 278  
 Matsuo, A.Y.O., 78  
 Miller Jr., R.R., 11  
 Minghetti, M., 450  
 Minier, C., 261  
 Miyamoto, A., 339  
 Modun, D., 434  
 Moon, T.W., 386  
 Moraes, G., 416  
 Moura, R.M., 216  
 Muccillo-Baisch, A.L., 36

Nadella, S., 441  
 Nakamura, M., 278  
 Nicholson, R.A., 351  
 Nogueira, C.W., 198  
 Nordbø, B., 470

Obi, T., 339  
 Okamoto, S., 278  
 Okuno, T., 339  
 Oliveira, E.M., 252  
 Oliveira, G.T., 179  
 Olsson, P.E., 129  
 Oris, J.T., 331  
 Otter, R.R., 331

Padilha, A.S., 252  
 Pavlović, S.Z., 122  
 Peçanha, F.M., 252  
 Pedemonte, F., 241  
 Pellicano, C., 399  
 Penning, L.C., 324  
 Peragón, J., 158  
 Pérez, J.C., 113  
 Pessoa, C., 409

Petrović, V.M., 122  
 Piccinni, E., 232  
 Pimenta, D.C., 424  
 Pivetta, L.A., 198  
 Pontieri, F.E., 399  
 Porcher, J.M., 129  
 Prohaska, J.R., 316  
 Pyatskowit, J.W., 316

Queiroz, A.F.S., 216

Raisuddin, S., 150, 299, 357  
 Ramos, D.F., 36  
 Rhee, J.-S., 150, 299, 357  
 Ribeiro, J.K.C., 216  
 Roberts, A.P., 331  
 Rocha, J.B.T., 198  
 Rodius, F., 69  
 Rodriguez-Acosta, A., 113  
 Romagueira Bichara dos Santos, L., 43  
 Roš, M., 61  
 Rothuizen, J., 324

Saičić, Z.S., 122  
 Salamunic, I., 434  
 Salazar, A.M., 113  
 Sales, P.B.V., 85  
 Sánchez, E.E., 113  
 Sanchez, W., 129  
 Sanni, B., 101  
 Santoro, M.L., 85  
 Santos, E.A., 216  
 Santovito, G., 232  
 Schlenk, D., 78  
 Seo, J.S., 357  
 Sepčić, K., 61  
 Shahmiri, S., 306  
 Shiraishi, M., 339  
 Silva, P.A., 36  
 Slump, E., 324  
 Soares, A.D., 36  
 Soares, S.S., 168  
 Sokolov, E.P., 101  
 Sokolova, I.M., 101  
 Sombra, C.M.L., 409

Sonne, C., 306  
 Spee, B., 324  
 Štajn, A.Š., 122  
 Stapleton, P.L., 78  
 Stefanon, I., 252  
 Stueckle, T.A., 366  
 Sun, Y., 293

Tadeu Rantin, F., 43  
 Tie Oba, E., 43  
 Tišler, T., 61  
 Trindade, G.S., 36  
 Trute, M., 78

Uno, T., 278  
 Urbatzka, R., 241

Vassallo, D.V., 252  
 Vasseur, P., 69  
 Verreault, J., 306

Walcher, B.N., 11  
 Wang, T., 293  
 Wei, T., 96  
 Wiggers, G.A., 252  
 Williams, K., 101  
 Wood, C.M., 441  
 Woodman, J.D., 271

Xu, Y., 293  
 Xue, J., 293

Yabuki, A., 339  
 Yamagata, H., 278  
 Yamauchi, K., 345  
 Yang, X.-L., 17  
 Yoon, Y.-D., 357  
 You, J., 293  
 Yu, W.-J., 17

Zeng, Q.-Y., 96  
 Zhang, D., 96  
 Zhang, S.-J., 17